NEW HAMPSHIRE DEPARTMENT OF ENVIRONMENTAL SERVICES

CERTIFICATION OF ORIGIN FOR SOILS CONTAMINATED WITH VIRGIN PETROLEUM PRODUCTS

NH Admin. Rules Env-Ws 412.16

The analytical testing requirement listed in Table 412-3 for petroleum contaminated soils destined for off-site treatment may be reduced if the soils are certified as virgin petroleum contaminated (VPC) soils. To obtain certification the following steps must be completed: 1) The site owner must complete a summary of site ownership and history of use and certify, based on his or her knowledge, that the soils are contaminated only with virgin petroleum products; 2) The site owner's environmental consultant must observe the site and the contaminated soils, review the site history and certify, based on his or her knowledge, that the soils are contaminated only with virgin petroleum products; and 3) Contaminated soils which are **not** generated from households or underground storage tank (UST) facilities regulated under RSA 146-C must pass the hazardous waste toxicity characteristic test (EPA method 8260B).

If the site history reveals no known activity during the past 30 years, which might have caused the soils to become a hazardous waste, the soils may be accepted by an off-site treatment facility as VPC soils. Hazardous Waste toxicity characteristic tests are not required for soil generated from household and UST facilities. For contaminated soils, which are **not** generated from households or UST facilities, a composite sample must be collected in accordance with Table 412-4. The soils or the leachate extraction (EPA method 1311) must be analyzed for volatile organic compounds using EPA method 8260B. If the soils pass both the site history test and the hazardous waste toxicity characteristic test, the soils are considered VPC soils and may be accepted by an off-site treatment facility.

If the site history shows activity during the past 30 years, which might have caused the soils to become contaminated with hazardous waste, the soils may still be certified as VPC soils by analyzing one composite sample for hazardous waste characteristics. The composite sample shall be collected in accordance with Table 412-4, and analyzed in accordance with the analytical methods listed in Table 412-3 for the hazardous waste characteristics, which may be present as indicated by the site history. If the concentrations of contaminants do not exceed the acceptable limits in Table 412-3, the soils may be certified as VPC soils. If the concentrations exceed the acceptable limits in Table 412-3, the soils cannot be certified as VPC soils, and must be disposed of as hazardous waste in accordance with NH Hazardous Waste Rules, Env-Wm 100-1000.

After the soils are certified as VPC soils, composite samples shall be collected in accordance with the attached Table 2 and analyzed for ignitability, volatile organics, and total petroleum hydrocarbons, using the analytical methods specified in Table 412-3. Please note that if the soils are certified as VPC soils and the quantity is less than 50 tons, sampling and analysis is not required by DES. The site owner must also obtain the receiving facility=s approval before transporting the soils. However, facilities may require ignitibility testing even though the quantity of sil is less then 50 tons. Individual processing facilities have varied levels of volatile organics and TPH that can be accepted, depending on air quality permit requirements. Soils, which fail the ignitability test may not be transported as VPC soils and must be disposed of as hazardous waste in accordance with NH Hazardous Waste Rules, Env-Wm 100-1000.

For all soils to be transported for off-site treatment under the certification process, a completed certification form and if greater than 50 tons analytical results must accompany the bill of lading. The completed certification form and the analytical results shall remain in the records of the site owner and the treatment facility and copies shall be forwarded to the DES immediately after the form is signed and the analytical results are available.

If the soils cannot be certified as VPC soils, samples for contaminated soils destined for off-site treatment shall be collected in accordance with Env-Ws 412-14 and analyzed for all the analytical methods listed in Table 412-3.

TABLE 2

Number of Composite Samples Required for VPC Certified Soils Destined for Off-Site Treatment	
Amount of Soil (in Tons)	**No. Of Composite Samples Required for Lab Analysis**
Less than 50	0
50 - 4,000	one for every 200 tons
Greater than 4,000	20 plus one additional for every 500 tons above initial 4,000 tons
8 core samples are required for each composite. Typical soils range from 1.0 to 1.5 tons/cubic yard	

TABLE 412-3

Testing Requirements for Soils Destined for Off-Site Treatment		
Analysis Required	**Analytical Methods**	**Acceptable Limits**
Ignitability	NHDES Ignitable Method	pass
Corrosivity	EPA Method 9045	2 to 12.5
Reactive Sulfide	SW846 7.3.4.1	Env-Wm 403.05(b)(5)
Reactive Cyanide	SW846 7.3.3.2	Env-Ws 403.05(b)(5)
Volatile Organics	EPA Method 8260B	Env-Ws 404
Semivolatile Organics	EPA Method 8270 or 8310	Env-Ws 404
PCB	EPA Method 8080	<2 ppm
TPH	NHDES TPH Method	Receiving Facility Limits
Metals preparation	EPA Method1311	
Arsenic	EPA Method 7060 or 6010	5 ppm
Barium	EPA Method 7080 or 6010	100 ppm
Cadmium	EPA Method 7130 or 6010	1 ppm
Chromium	EPA Method 7190 or 6010	5 ppm
Lead	EPA Method 7420 or 6010	5 ppm
Mercury	EPA Method 7470 Cold Vapor	0.2 ppm
Selenium	EPA Method 77 40 or 6010	1 ppm
Silver	EPA Method 7760 or 6010	5 ppm
Endrin	EPA Method 8080	0.02 ppm
Lindane	EPA Method 8080	0.4 ppm
Methoxychlor	EPA Method 8080	10 ppm
Toxaphene	EPA Method 8080	0.5 ppm
2,4-D	EPA Method 8150	10 ppm
2,4,5-TP	EPA Method 8150	1.0 ppm

TABLE 412- 4

Number of Core Samples Required in Composite Sample for Certification of Petroleum Contaminated Soils	
Amount of Soil (in Tons)	**No. of Core Samples in Composite Sample**
Less than 10	2
11 - 50	5
51 - 100	8
101 - 200	8
201 - 300	8
301 - 400	10
401 - 500	12
501 - 600	14
601 - 700	16
701 - 800	18
801 - 900	20
901 - 1,000	22
1,001 - 2,000	36
2,001 - 4,000	64
4,001 - 8,000	120
8,001 - 16,000	232

NEW HAMPSHIRE DEPARTMENT OF ENVIRONMENTAL SERVICES

CERTIFICATION OF ORIGIN FOR SOILS CONTAMINATED WITH VIRGIN PETROLEUM PRODUCTS

Site Information:
DES Site Number: _____ Site Name: _____

Address: _____

Town: _____

Transport Information:
Estimated Volume/Weight:_____(Cubic Yards /Tons)

Transporter Name: _____

Receiving Facility: _____

Owner Certification:
Owner's Name/Contact Person: _____ Phone: _____

Contact Person's Title: _____

Company Name: _____

Address: _____

Town: _____ State: _____ Zip: _____

I certify that to the best of my knowledge the information on the activities and operations conducted at this location for the past 30 years, as described in the site history summary on the reverse of this certification is accurate. I also certify that, to the best of my knowledge, all soils to be transported from this site and under a bill of lading and in accordance with the transport information listed above are contaminated only with virgin petroleum products.

_____ _____
(Owner's Signature) (date)

DES/Consultant's Certification:
DES Staff/Consultant's Name: _____ Phone: _____

Firm's Name: _____

Address: _____

Town: _____ State: _____ Zip: _____

I certify that I was present at the site and observed the contaminated soils to be shipped under a bill of lading and the location from which the soils were excavated. I have reviewed the site history summary on the reverse side of this certification and I have reviewed all soil analyses required under Env-Ws 412.16(e). To the best of my knowledge, all soils to be transported from this site in accordance with the transport information listed above are contaminated only with virgin petroleum products.

NEW HAMPSHIRE DEPARTMENT OF ENVIRONMENTAL SERVICES

CERTIFICATION OF ORIGIN FOR SOILS CONTAMINATED WITH VIRGIN PETROLEUM PRODUCTS

30 YEAR SITE HISTORY

Site Information:

DES Site Number: _____ Site Name: _____

Address: _____

Town: _____

Dates From To	Owner Name	Business Name	Type of use (see below)	Source of Information (do not leave blank)

Type of Use:

1 – Fuel Dispensing Only
2 – Fuel & Auto Repair
3 – General Repair & Maintenance
4 – Electronics manufacturing
5 – Metal Working
6 – Scrap Yard
7 – Residential
8 – School
9 – Other(Specify)